

REMARKS

Applicant would like to thank the Examiner for the careful consideration given the present application. The application has been carefully reviewed in light of the Office action, and amended as necessary to more clearly and particularly describe the subject matter which applicant regards as the invention.

Claims 1-12 and 14-17 remain in the application. Claim 13 has been cancelled previously. Claims 12 and 14-17 stand rejected under 35 U.S.C. §112, second paragraph, as being indefinite. Specifically, regarding claim 12, the Examiner questions the clarity of the phrase "element is air-permeable at least segment-wise, for instance in the form of a grid or perforations." This phrase has been clarified, removing the term "for instance" and now states "element is air-permeable at least segment-wise, having the form of a grid or perforations." Reconsideration and withdrawal of the rejection of claim 12 under section 112 is requested.

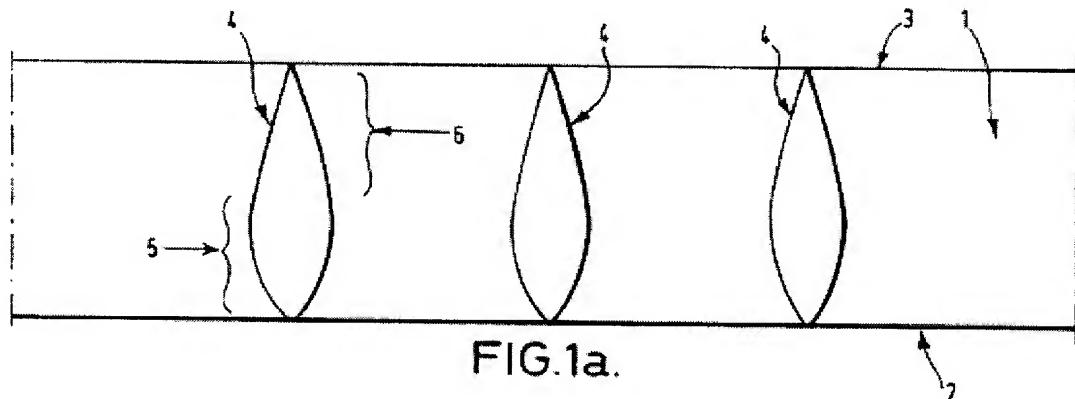
Regarding claims 14-17, which are dependent claims, the Examiner objects to initial the reference to a "planar element." Claim 14 has been rewritten in independent form as a planar element for use as part of a rotor blade. Claims 15-17 depend directly from amended claim 14.

Claim 17 has been further objected to for lacking clarity in the conjunctive relationship of the materials of construction listed. This has been clarified by amendment to claim 17.

Reconsideration and withdrawal of the rejection of claims 14-17 under section 112 is requested.

Claims 1-7 and 14-15 stand rejected under 35 U.S.C. §102(b) as being anticipated by GB 2,374,331 to Ledingham (hereinafter Ledingham). For the following reasons the rejection is traversed.

Ledingham is directed to an aerodynamic device including an aerofoil having a leading and trailing edge and one or more protruding aerodynamic surfaces positioned upon the fluid accelerating surface of the aerofoil. The protrusions may be fixed or movable and may extend/retract into the fluid stream in combination with flaps or slats. The aerofoil may be used on aircraft, propeller, windmill, watermill, helicopter, boat or turbine applications. Fig. 1a of Ledingham is reproduced below



Regarding claim 1, Ledingham fails to disclose a rotor blade device that includes "at least one planar element which is mounted by one of its narrow sides onto the suction side" of the blade. Rather, the protruding aerodynamic surfaces of Ledingham are not planar and mounted in an equivalent manner as the claimed element. Webster's defines planar as "two-dimensional in quality". Applicant's specification discusses planar items extensively and, referring to paragraphs [0016-0017] of the substitute specification, likens their shape to boundary layer fences of known aircraft. Referring to Fig. 1a and 1b of Ledingham, the surfaces 4 described therein are not planar with a narrow side mounted to the suction side of the blade.

Clearly the widest side of the aerodynamic surface of Ledingham is mounted to the blade therein.

Because such planar elements are not disclosed by Ledingham, claim 1 is not anticipated and reconsideration and withdrawal of the rejection of claim 1 is respectfully requested.

Claims 2-7 depend directly or indirectly from claim 1 and are believed to be allowable at least for the reasons stated above. Reconsideration and withdrawal of the rejection of claims 1-7 under section 102(b) over Ledingham is respectfully requested.

Independent claim 14 includes the patentable features of claim 1 described above and is believed to be allowable at least for the reasons stated above. Claim 15 depends from claim 14. Reconsideration and withdrawal of the rejection of claims 14 and 15 under section 102(b) over Ledingham is respectfully requested.

Claims 1, 4, 6-11 and 14-17 stand rejected, also under 35 U.S.C. 102(b), as being anticipated by WO/2002/08600 to Corten (hereinafter Corten). For the following reasons, the Examiner's rejection is traversed.

Corten is directed to a wind turbine blade that attaches to a hub via a connection part. The blade includes a number of vortex generators which extend perpendicular to the plane of the connection part, preferably at an angle of 15° relative to the plane perpendicular to the longitudinal axis of the blade.

Regarding claim 1, Corten fails to disclose a cross flow reducing planar element with "the height and length of the planar element being selected so that said element shall effectively reduce said cross flow", as required. Rather, Corten discloses common vortex generators which increase cross flow. A summary of what

a vortex generator does (and why the claimed invention is different from a vortex generator) is provided in the Specification of Applicant's application (see paragraph 0006 of the Substitute Specification). In brief, vortex generators create local turbulences which reduce large area detachment of airflow around the contour of the blade. But these vortex generators also *increase* cross flow on the blade by changing some of the laminar flow across the blade width into turbulent flow. This is contrary to the statement of the Examiner in the Office action. Corten provides these vortex generators in such a size that increases cross flow via turbulence generation. Here specifically, the vortex generators in Corten have a relatively short length. If such vortex generators were to reduce cross flow in Corten, their length would need to be increased significantly (this would reduce their ability to create the turbulent flow desired by Corten however and would be undesirable in the Corten device).

Because Corten does not disclose all of the features of claim 1, reconsideration and withdrawal of the rejection of claim 1 under section 102(b) over Corten is respectfully requested.

Claims 4 and 6-11 depend directly or indirectly from claim 1 and are believed to be allowable at least for the reasons stated above. Reconsideration and withdrawal of the rejection of claims 4 and 6-11 under section 102(b) over Corten is respectfully requested.

Independent claim 14 includes the patentable features of claim 1 described above and is believed to be allowable at least for the reasons stated above. Claims 15-17 depend from claim 14. Reconsideration and withdrawal of the rejection of claims 14-17 under section 102(b) over Corten is respectfully requested.

In light of the foregoing, it is respectfully submitted that the present application is in a condition for allowance and notice to that effect is hereby requested. If it is determined that the application is not in a condition for allowance, the Examiner is invited to initiate a telephone interview with the undersigned attorney to expedite prosecution of the present application.

If there are any additional fees resulting from this communication, please charge same to our Deposit Account No. 18-0160, our Order No. SCH-16606.

Respectfully submitted,

RANKIN, HILL & CLARK LLP

By /James A. Balazs/
James A. Balazs, Reg. No. 47401

38210 Glenn Avenue
Willoughby, Ohio 44094-7808
(216) 566-9700